

New York State Department of Transportation

Yellow Flag NB23U4W016

By: Malav Shah

Flag Date: May 04, 2023

Superseding Information:

This flag supersedes: YF NB2228W021

Structure Information

BIN: 1065318

Feature Carried: 278I278IX2M23027

Feature Crossed: 6TH AVENUE

Orientation: 8 - NORTHWEST

Region: 11 - NEW YORK CITY

County: KINGS

Political Unit: City of NEW YORK

Approximate Year Built: 1962

Posted Load Matches Inventory : Yes

Bridge Load Posting (Tons) : Not Posted for Load

Primary Owner: New York State Department of Transportation

Primary Maintenance Responsibility: 12 - State - Subcontracted to another Party

Typical or Main Span Type: 3 - Steel, 02 - Stringer/Multi-Beam or Girder

This Bridge is not a Ramp

Number of Spans: 322

Verbal Notification Information

Person Notified: Heinz Joachim, P.E.

Date: May 04, 2023 1:00:00 PM

Of: NYSDOT Region 11

Signature Information

Signature: Malav Shah, P.E. 106620-1

Date: May 25, 2023

Reviewed By: Robert Kemp

Date: May 25, 2023

Attachments: 6

Flagged Elements

Parent Element	Element	Total Quantity	Unit
Span Number : 318			
	PR202 - Steel Column	4	each

Flagged Condition Description

Yellow Flag No. NB23U4W016

Location: Pier 318, Column C3.

Description: Column C3 exhibits 34% (previously noted as 35%) overall section loss at the base of the column interface with the concrete encasement, with a 2" diameter corrosion hole above the concrete encasement. There has been no significant changes since the previous inspection.

This Yellow Flag No. NB23U4W016 is superseding Yellow Flag No. NB2228W021.

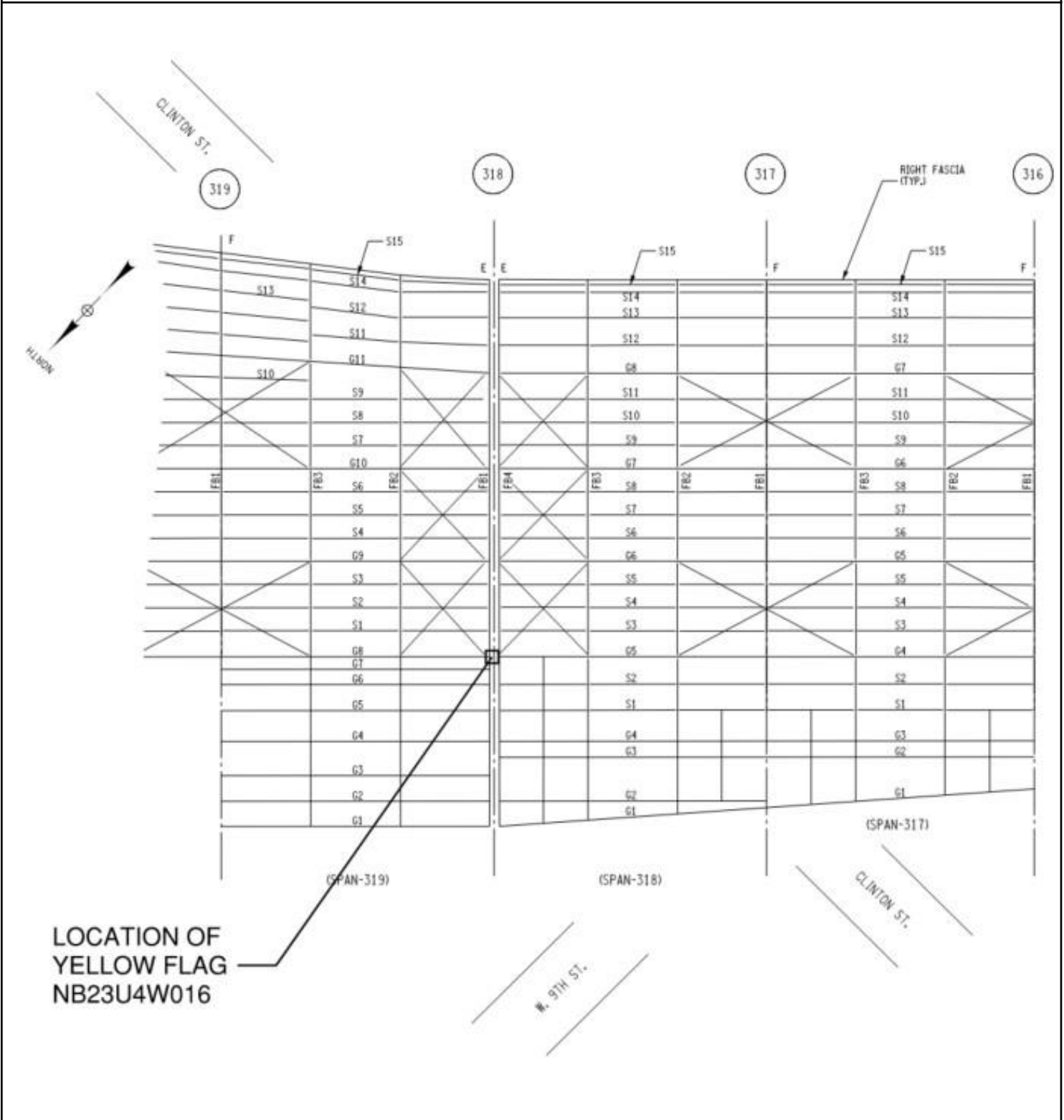
Notes:

1. Active joint leakage was noted directly above Column C3 with water seeping inside the column.
2. At the right face of the Column C3 there is a perforated steel plate with two small openings with very sharp edges, making access to the inside of the column difficult.
3. Column C3 is located on the wide raised median of Hamilton Avenue and the base was accessed by walking.
4. The broken concrete encasement at the base of Column C3 is issued a NSCO under separate cover.
5. The 2" diameter hole was not included in calculations since it is 3" above encasement.

Flag Photographs

Photo Number: 1

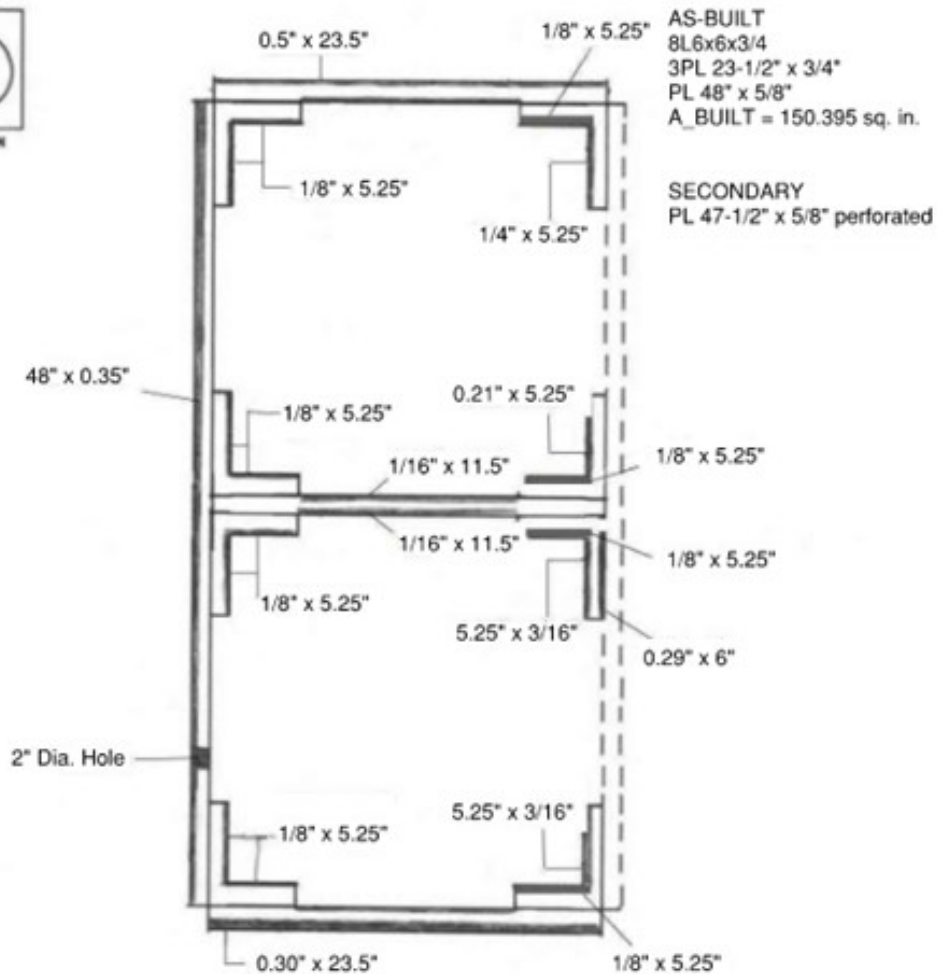
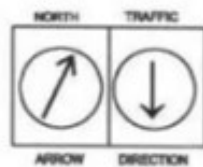
Photo Filename: NB23U4W016 LOCATION PLAN.JPG



Attachment Description: Flag Location Plan

Photo Number: 2

Photo Filename: NB23U4W016 Condition Sketch.jpg

**Section Loss - Column C3 (at base)**

Left Plate - 0.35" x 48" = 16.8 sq. in.

End Plate - 0.5" x 23.5" = 11.75 sq. in.

Begin Plate - 0.3" x 23.5" = 7.05 sq. in.

Inner Plate - 1/16" x 2 x 11.5" = 1.44 sq. in.

Connection Angles SL - (1/8" x 12 + 3/16" x 2) x
5.25" + 0.29" x 6" + 0.21" x 5.25" + 0.25" x 5.25"
= 14 sq. in.

Overall Section Loss - 51.04 sq. in.

Original As-built Area - 150.4 sq. in.

Overall Section Loss - 33.9%

PIER 318 C3
NTS

Total Section Loss = 51.04 sq. in.
% Section Loss = 34%

Secondary Plate at right face was not included in calculations.**Attachment Description: Flag Condition Sketch**

Photo Number: 3

Photo Filename: P5042879.JPG



Attachment Description: Pier 318 Begin Face. General view of the flagged location in Column C3. Looking End.

Photo Number: 4

Photo Filename: P5042883.JPG



05/04/2023

Attachment Description: Span 318, Pier 318 Column C3 Left Face. Heavy pitting at the base of the column with a 2" diameter corrosion hole above the concrete encasement. Looking Right. Note: The broken concrete encasement issued a NSCO under separate cover.

Photo Number: 5

Photo Filename: P5022821.JPG



Attachment Description: Span 318, Pier 318 Column C3 End and Right Faces. Heavy pitting at the base of the column and signs of active leakage (circled). Looking Begin Left.

Photo Number: 6

Photo Filename: P5022820.JPG



Attachment Description: Span 318, Pier 318 Column C3. Close-up view inside the begin portion of Column C3. Heavy pitting and 2" diameter hole. Looking Left.